

Notice of Allowability**Application No.**

10/599,870

Examiner

MICHAEL PEPITONE

Applicant(s)

LITKE ET AL.

Art Unit

1767

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to 11/30/11.
2. ☐ An election was made by the applicant in response to a restriction requirement set forth during the interview on _____; the restriction requirement and election have been incorporated into this action.
3. ☒ The allowed claim(s) is/are 34-40 and 43-46.
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some* c) ☐ None of the:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has **THREE MONTHS FROM THE "MAILING DATE"** of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
6. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
- (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
- 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
- (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).**
7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☐ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
5. ☐ Notice of Informal Patent Application
6. ☒ Interview Summary (PTO-413), Paper No./Mail Date 1/18/12.
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____.

/Michael Pepitone/
Primary Examiner, Art Unit 1767

EXAMINER'S AMENDMENT

An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Steven Bauman on 1/18/12.

The application has been amended as follows:

In claim 38, line 3, "the curable acrylates" has been substituted by --trimethylolpropane triacrylate--.

In claim 43, lines 1-3, "The UV curable coating composition of Claim 34, further comprising at least one light stabilizer." has been substituted by --A UV curable coating composition which when cured is abrasion resistant, said composition consisting of:

- a) trimethylolpropane triacrylate in an amount between about 5% and about 85% by weight of the composition,
- b) N,N-dimethyl acrylamide in an amount between about 1 and about 30% by weight of the composition,
- c) an inorganic filler consisting of silica nanoparticles in an amount between about 30 and about 50% by weight of the composition and wherein at least about 50% of the silica nanoparticles are present as a premix with trimethylolpropane triacrylate,
- d) at least one photoinitiator which absorbs only in the UV range of the electromagnetic spectrum, and

e) at least one light stabilizer; wherein a cured coating of the UV curable coating composition maintains about 95% or higher of its post-cure gloss when subjected to about 100 cycles of grade 3 steel wool with a load of about 50 lbs applied per Federal Specification FF-W-1825.--.

In claim 44, line 2, "wherein at least" has been substituted by --wherein the at least--.

In the specification page 1, after the title, please add --CROSS-REFERENCE TO RELATED APPLICATIONS-- as a new heading.

In the specification page 1, please add --This application is a 371 National Stage Application of PCT/US05/12336, filed on April 12, 2005 and claims the benefit of U.S. Provisional Application No. 60/563,646, filed April 20, 2004. -- as a new paragraph under the heading listed above.

Claims 34-40 and 43-46 are allowed.

The following is an examiner's statement of reasons for allowance: While Bilkadi *et al.* (US 5,677,050) discloses an abrasion resistant coating containing a ceramer (abstract), wherein Preparation 1 (10:24-39) contains 54.2 wt% TMPT, 8.4 wt% NNDMA, and 38.8 wt% acrylated silica in Preparation 1 {designated as CER1; TMPT premixed with silica} (10:59-11:5) [see Office action mailed 9/23/11], the transitional phrase "consisting of" in instant claim 34 excludes any element, step, or ingredient not specified in the claim. *In re Gray*, 53 F.2d 520, 11 USPQ 255 (CCPA 1931); *Ex parte Davis*, 80 USPQ 448, 450 (Bd. App. 1948) ("consisting of" defined as "closing the claim to the inclusion of materials other than those recited except for impurities ordinarily associated therewith.") [see MPEP 2111.03], and therefore removes the rejection of claims based upon Bilkadi *et al.* (US '050), as Bilkadi *et al.* (US '050) requires a ceramer

containing a surface modified silica (2:34-44; 2:61-3:8; 3:63-65). The “consisting of” format of the instant claims precludes surface modified silica [ceramer]; there would be no motivation to remove the inventive ceramer from Bilkadi *et al.* (US ‘050).

Kang *et al.* (US 6,265,061) discloses an abrasion resistant coating (abstract, 1:15-20, 5:23-35; ex. 4) comprising a ceramer (4:14-40, 7:20-38), wherein example 4 (29:65-30:12) was prepared as example 1 (28:50-29:26) and contains 56.2 parts by weight {pbw} trimethylolpropane triacrylate (TMPTA); 35.2 pbw of a colloidal silica having an average particle size of 20 nm {NALCO 2327}, 15.6 pbw N,N-dimethylacrylamide {N,N-DMA}, 0.7 pbw of a photoinitiator which absorbs in the range of 180-400 nm (below 333 nm) {IRGACURE 184 (1-hydroxy-cyclohexyl-1-phenyl-ketone)} [see specification, ¶ 29] (29:5-8), and 0.2 pbw phenothiazine (ex. 4; 29:65-30:12) [see Office action mailed 9/23/11]. However, the transitional phrase “consisting of” in instant claim 34 excludes any element, step, or ingredient not specified in the claim. *In re Gray*, 53 F.2d 520, 11 USPQ 255 (CCPA 1931); *Ex parte Davis*, 80 USPQ 448, 450 (Bd. App. 1948) (“consisting of” defined as “closing the claim to the inclusion of materials other than those recited except for impurities ordinarily associated therewith.”) [see MPEP 2111.03], and therefore removes the rejection of claims based upon Kang *et al.* (US ‘061), as Kang *et al.* (US ‘061) requires a ceramer containing a surface modified silica (abstract, 1:15-20, 5:23-35; 4:14-40, 7:20-38, 29:65-30:12; ex. 4). The “consisting of” format of the instant claims precludes surface modified silica [ceramer]; there would be no motivation to remove the inventive ceramer from Kang *et al.* (US ‘061).

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue

fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Correspondence

Any inquiry concerning this communication or earlier communications from the examiner should be directed to MICHAEL PEPITONE whose telephone number is (571)270-3299. The examiner can normally be reached on M-F, 7:30-5:00 EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mark Eashoo can be reached on 571-272-1197. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Michael Pepitone/
Primary Examiner, Art Unit 1767